Appendix B. Changing PNFS Tags

B.1 Caveat

Tags (i.e., tag values) can be changed if the standard UNIX permissions on them allow for it. However, thought and planning should go into structuring the storage of an experiment's data, and users should not change any tags without consulting the people in their experiment responsible for this task. The storage group tag cannot be changed by users.

B.2 Permissions and Ownership



This is typically done by your experiment's Enstore liaison. Most users do not have permissions to change permissions and ownership.

The permissions shown in the output of the **enstore pnfs** --tags command (see section 3.2.2 *How to View Tags*) indicate whether you can change the value of the tag or not. To change a tag, you need to use the **enstore pnfs** command with one of the options --tagchown or --tagchmod to change ownership or permissions, respectively (see section 8.4 *enstore pnfs*).

For example, to add write permission for "other" to the permissions for the file family tag, you'd enter (include the quotes):

```
% enstore pnfs --tagchmod o+w file_family
or you can use the absolute form for the mode, e.g.,
% enstore pnfs --tagchmod [0]646 file family
```

To change the ownership, run a command like either of the following, using userid or userid groupid, or any associated combination:

```
% enstore pnfs --tagchown xyz file_family
% enstore pnfs --tagchown xyz.g023 file_family
```

B.3 How to Set a Tag

To set one or more tags on a directory, **cd** to that directory and run the **enstore pnfs** command with the option for the tag you want to reset. It is ok to change tags on a directory into which files have already been written; Enstore will still be able to find the files.

These operations are for Enstore admins or designated gurus only; the commands succeed only if permissions allow.

--file-family <FILE_FAMILY_NAME>

If permissions allow, this will reset the file-family name of the current pnfs directory to the specified value. Example:

\$ enstore pnfs --file-family newfamilyname

--file-family-width <FILE_FAMILY_WIDTH>

If permissions allow, this will reset the file-family width of the current pnfs directory to the specified value. Example:

\$ enstore pnfs --file-family-width 2

--file-family-wrapper <FILE_FAMILY_WRAPPER>

If permissions allow, this will reset the file-family wrapper of the current directory to the specified value. Example:

\$ enstore pnfs --file-family-wrapper cpio_odc

--library <LIBRARY>

Provides a name to reset the library tag. Example:

\$ enstore pnfs --library mylib

[Errno 13] Permission denied: '/pnfs/test/xyz/srmtest/test_1_1/.(tag)(library)'

Run the **enstore pnfs** --tags command to see the changes you make; see section 8.4 *enstore pnfs*.